

REMARKS/ARGUMENTS

Applicant respectfully requests reconsideration of the present application in view of the foregoing amendments and in view of the reasons that follow. Claims 1-5, 7-32, and 34-36 are being amended to correct typographical errors, to correct antecedent basis, and to more clearly set forth Applicant's claimed invention. Claims 6 and 33 are being canceled.

Applicants respectfully submit that no new matter has been added to the claims, and that the claim amendments do not necessitate a new search by the Examiner. After amending the claims as set forth above, Claims 1-5, 7-32, and 34-36 are now pending in this application.

I. Claim Rejections Under 35 U.S.C. § 102(e)

A. Claims 1, 21, and 31

In section 2 of the Office Action, Claims 1-11, 13-15, 17-25, and 27-36 were rejected under 35 U.S.C. § 102(e) as being anticipated by United States Patent No. 6,744,740 to Chen (hereinafter "Chen"). Applicant respectfully traverses the rejection.

Claim 1, as currently amended, recites "selecting a path from the plurality of paths for communication between the source node and the destination node **based at least in part on a propagation delay** of the path, wherein the propagation delay is a **time taken** for at least one of said second message and said first message **to propagate between each node** on the path." (Emphasis added). Claim 21, as currently amended, recites "selecting means configured to select a path from said plurality of paths for communication between said source node and said destination node based at least in part on a **propagation delay** of the path, wherein the propagation delay is a **time taken** for at least one of said second and first messages **to propagate between each node** on the path." (Emphasis added). Claim 31, as currently amended, recites "means for storing the first time and the second time in a metrics field of the at least one message such that a propagation delay of the at least one message can be determined, wherein the **propagation delay** is an **amount of time that the** at least one **message is in between nodes** as the at least one message travels from the source node to the destination node." (Emphasis added). Applicant respectfully submits that Chen does not

teach, suggest, or describe use of a “propagation delay” for use in selecting a propagation path as recited in Claims 1, 21, and 31.

Chen is directed toward a “system 10 [which] designates one or more cluster heads from the wireless devices (nodes).” (Col. 3, lines 66-67). “[E]ach cluster head 30 determines its geographical location, selectively receives and stores location information of the other cluster heads, and calculates stores the locations of all nodes within its own cluster, in order to create an optimal network using the location information to continually update the shortest data paths ... across the wireless network 14.” (Col. 4, lines 3-10). In Tables 2 and 3, Chen does disclose that a single time stamp entry may be stored “in temporary memory.” (Col. 8, lines 34-36). Chen also discloses that when “packets reach the destination node, the destination node will pick the most optimum path (i.e., shortest # of hops, shortest time, or some other metric), and send a “Path Update” message back to the Source Node through the picked path.” (Col. 10, lines 47-51). However, it is clear that the “shortest time” referred to by Chen is the shortest total time for a message to go from the source node to the destination node. This shortest total time is not the same as the “propagation delay” required by Applicant’s claims.

As defined in the claims, the propagation delay is the amount of time which a message is propagating between nodes, and does not include processing delays at each node along a given path. As such, the propagation delay differs from the total time it takes for the message to go from the source node to the destination node. Chen does not teach, suggest, or describe such a propagation delay. Rather, in Tables 2 and 3, Chen discloses a single timestamp associated with a given node. This single timestamp cannot be used to determine “propagation delay,” because a single timestamp cannot convey both the receipt time of a message and the transmission time of the message from the same node such that processing time at the node can be determined. As such, the single timestamp cannot be used to determine “propagation delay” as defined in the claims. For at least these reasons, Applicant respectfully submits that Chen does not teach or suggest each of the limitations recited in independent Claims 1, 21, and 31.

For at least these reasons, Applicant respectfully submits that Claims 1, 21, and 31 are in condition for allowance. For at least the same reasons, Applicant respectfully submits that Claims 2-5, 7-11, 13-15, and 17-20, which depend from Claim 1, are also in condition for allowance. Applicant also respectfully submits that Claims 22-25 and 27-30, which depend from Claim 21, and Claims 32 and 34-36, which depend from Claim 31, are also in condition for allowance. Applicants respectfully request withdrawal of the rejection of Claims 1-5, 7-11, 13-15, 17-25, 27-32, and 34-36.

B. Claim 17

Claim 17 recites “a routing algorithm [which] uses a priority value to weight a parameter which is used for selecting the path for communication between the source node to the destination node.” In section 2 of the Office Action, the Examiner states that “Chen discloses the claimed limitation (col. 4/ln. 40-52, col. 7/ln. 21-31, col. 14/ln. 20-21, col. 14/ln. 34-35, col. 14/ln. 28-31, where it is clear that the system selected the shortest route that provide the best connectivity).” Applicant respectfully disagrees.

Chen fails to disclose or suggest “a routing algorithm” which “uses a priority value to weight a parameter,” as recited in Claim 17. There is no discussion in Chen of weighting parameters or assigning various priorities to various parameters. Chen simply discloses that “the destination node will pick the most optimum path (i.e., shortest # of hops, shortest time, or some other metric), and send a “Path Update” message back to the Source Node through the picked path.” (Col. 10, lines 47-51). Applicant respectfully submits that picking a most optimum path is not the same as “a routing algorithm” which “uses a priority value to weight a parameter which is used for selecting the path,” as recited in Claim 17.

For at least these reasons, Applicant respectfully submits that Claim 17 is in condition for allowance, and requests withdrawal of the rejection.

C. Claim 18

Claim 18 recites “a routing algorithm [which] uses a mapping value that indicates a degree to which a measured parameter value meets a predefined parameter value.” Applicant cannot find in the Office Action where the Examiner separately provides reasons for the

rejection of Claim 18. Applicant respectfully submits that Chen fails to teach or suggest “a routing algorithm” which “uses a mapping value that indicates a degree” to which a “parameter” “meets a predefined parameter value,” as recited in Claim 18. As such, Applicant respectfully requests withdrawal of the rejection of Claim 18 under 35 U.S.C. § 102(e).

II. Claim Rejections Under 35 U.S.C. § 103(a)

In section 4 of the Office Action, Claims 12, 16, and 26 are rejected under 35 U.S.C. § 103(a) as being unpatentable over Chen in view of United States Patent No. 6,115,580 to Chuprun et al. (hereinafter “Chuprun”). Applicant respectfully traverses the rejection.

Chuprun discloses a “system [which] uses ... terrain information and knowledge of network node locations to estimate the quality of node-to-node links in the network (e.g., by estimating path-loss between nodes). The link quality information is then used to determine an optimal connection path between two nodes.” (Col. 2, lines 6-11; emphasis added). Thus, Chuprun discloses determining a communication path between nodes by using link quality information which is based on terrain information and locations. As with Chen, Chuprun fails to teach or suggest use of a “propagation delay” for use in selecting a propagation path as recited in Claims 1 and 21.

For at least these reasons, Applicant respectfully submits that, alone or in combination, Chen and Chuprun do not teach of the limitations required by Claims 1 and 21. As such, Applicant respectfully submits that Claims 1 and 21 are in condition allowance. For at least the same reasons, Applicant submits that Claims 12 and 16, which depend from Claim 1, and Claim 26, which depends from Claim 21, are also in condition for allowance. Applicant respectfully requests withdrawal of the rejection.

Applicant believes that the present application is now in condition for allowance. Favorable reconsideration of the application as amended is respectfully requested.

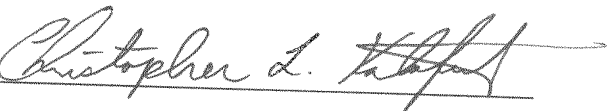
The Examiner is invited to contact the undersigned by telephone if it is felt that a telephone interview would advance the prosecution of the present application.

The Commissioner is hereby authorized to charge any additional fees which may be required regarding this application under 37 C.F.R. §§ 1.16-1.17, or credit any overpayment, to Deposit Account No. 19-0741. Should no proper payment be enclosed herewith, as by a check or credit card payment form being in the wrong amount, unsigned, post-dated, otherwise improper or informal or even entirely missing, the Commissioner is authorized to charge the unpaid amount to Deposit Account No. 19-0741. If any extensions of time are needed for timely acceptance of papers submitted herewith, Applicant hereby petitions for such extension under 37 C.F.R. §1.136 and authorizes payment of any such extensions fees to Deposit Account No. 19-0741.

Respectfully submitted,

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FOLEY & LARDNER LLP
Customer Number: 23524
Telephone: (608) 258-4286
Facsimile: (608) 258-4258

By 

Christopher L. Kalafut
Attorney for Applicant
Registration No. 57,946